

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICANT: JOHN M. BELCEA

TITLE: TIME DIVISION PROTOCOL FOR AN AD-HOC, PEER-TO-PEER
RADIO NETWORK HAVING COORDINATING CHANNEL ACCESS
TO SHARED PARALLEL DATA CHANNELS WITH SEPARATE
RESERVATION CHANNEL

SERIAL NUMBER: 09/

FILING DATE:

GROUP: ART UNIT

EXAMINER:

To: The Commissioner of Patents and Trademarks
Washington, D. C. 20231

PRELIMINARY AMENDMENT

Sir:

In advance of the first office action, 1997, please amend the above-identified
application as follows.

IN THE CLAIMS:

Cancel claim 1, and add the following new claims.

CLAIM 51. A protocol for use in an ad-hoc, peer-to-peer radio system comprising a series of terminals where each said terminal is capable of making at least one of an outgoing call or receiving an incoming call, and where each said terminal comprising computer means, memory means for storing program software means therein, and where each said terminal is capable of being hop of a routing path connecting a call from a source to a destination, comprising:

software means for said memory means of each said terminal, said software means comprising means for generating communications-information for transmission based on time- division messaging;

said communications-information comprising a series of time frames (TM) each divided into a series of time slots (TS); said communications-information comprising at least one time slot in which control-channel (CC) messaging information is transmitted, and other time slots in which is transmitted channel data (CD) messaging information;

each said time frame (TF) comprising a last time slot;

said software means further comprising means for generating initial control communications-information in a respective said last time slot (LTS) of a respective said time frame (TF) indicating initial presence of a respective said terminal in order to start communicating with other said terminals.

CLAIM 52. The protocol for use in an ad-hoc, peer-to-peer radio system according to claim 51, wherein the length of each said time slot for transmitting said communications-information is equal to each other.

CLAIM 53. The protocol for use in an ad-hoc, peer-to-peer radio system according to claim 52, wherein said software means further comprises means for switching transmission of initial control communications-information from said last time slot (TS) to another, free, earlier time slot of a subsequent time frame (TF) in order to reduce the chance of collision with other said terminals also initially registering.

CLAIM 54. The protocol for use in an ad-hoc, peer-to-peer radio system according to claim 53, wherein said initial control communications-information in said last time slot (TS) and in said another, free, earlier time slot of a subsequent time frame (TF) are transmitted at a frequency F_0 .

CLAIM 55. The protocol for use in an ad-hoc, peer-to-peer radio system according to claim 51, wherein said at least one time slot (TS) for said control-channel (CC) information is transmitted at a first power level, and said other time slots (TS) for said data-channel(DC) information are transmitted at a second power level.

CLAIM 56. The protocol for use in an ad-hoc, peer-to-peer radio system according to claim 55, wherein said second power level is equal to or less than said first power level, whereby RF interference is reduced.

CLAIM 57. In a protocol for use in a network of terminals each having computer means, memory means for storing program, and software means therein, said software means of each said terminal comprising means for generating communications-information for transmission based on time division messaging, said communications-information comprising a series of time frames (TM) each divided into a series of time slots (TS); said communications-information comprising at least one time slot in which control-channel (CC) messaging information is transmitted, and other time slots in which is transmitted channel data (CD) messaging information, the improvement comprising:

each said time frame (TF) comprising a last time slot;

said software means further comprising means for generating initial control communications-information in a respective said last time slot (LTS) of a respective said time frame (TF) indicating initial presence of a respective said terminal in order to start communicating with other said terminals.

R E M A R K S

The present amendment has been submitted in order to add new claims 51-57. No new matter has been added.

Respectfully submitted,

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